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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/625,343	07/23/2003	Jeffrey A. Frey	POU999041US2	8592
46369	7590	05/04/2006	EXAMINER	
HESLIN ROTHENBERG FARLEY & MESITI P.C.			ZHEN, LI B	
5 COLUMBIA CIRCLE			ART UNIT	
ALBANY, NY 12203			PAPER NUMBER	

2194

DATE MAILED: 05/04/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/625,343	FREY ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Li B. Zhen	2194	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 06 February 2006.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1,3-11,13-22 and 24-50 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1,3-11,13-22 and 24-50 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.


**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

  
**WILLIAM THOMSON**  
SUPERVISORY PATENT EXAMINER

**Attachment(s)**

- |                                                                                         |                                                                             |
|-----------------------------------------------------------------------------------------|-----------------------------------------------------------------------------|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                        | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)    | Paper No(s)/Mail Date. _____                                                |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____                                                             | 6) <input type="checkbox"/> Other: _____                                    |

**DETAILED ACTION**

1. Claims 1,3-11,13-22 and 24-50 are currently pending in the application.

***Specification***

2. Examiner acknowledges receipt of the reference "CORBA A Guide to Common Object Request Broker Architecture" by Ron Ben-Natan [pp. 275-307] and a compact disc containing copies of 11 electronic references. Also included was a printed reference titled "Autonomous and Mobile Agents in Distributed Network Management and Monitoring System" by Uma Shanker that references the "CORBA 2.2/IIOP Specification"; however, examiner was unable to locate the copy of the "CORBA 2.2/IIOP Specification" and the URL provided links to an error page.

3. The disclosure is objected to because it contains an embedded hyperlink and/or other form of browser-executable code [p. 14, lines 12-15]. Applicant is required to delete the embedded hyperlink and/or other form of browser-executable code. See MPEP § 608.01.

***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which the subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. **Claims 1,3-11,13-22 and 24-50 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent No. 5,802,367 to Held et al. [hereinafter Held] in view of U.S. Patent No. 6,442,620 to Thatte et al. [hereinafter Thatte], both references cited in the previous office action.**

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6. As to claim 1, Held teaches the invention substantially as claimed including a method of providing access to an object of a computing environment [access either a new object or an existing object of a sharable class or to access a class factory object for instantiating such an object; col. 10, line 34 – col. 11, line 17], the method comprising:

requesting access, by a requester, to an object located in an address space of the computing environment, the requester being resident within the address space [col. 10, lines 62 – 67]; and providing access to the object using a local access proxy [local RPC mechanisms with a server executable or with a surrogate process; col. 10, lines 60 - 67] located within the address space [function determines whether the determined server node is the same as the local node (where the client program 701 is executing) and, if so, continues at step 712, else continues at step 713. In step 712, the function executes analogous steps to steps 717 through 719 to start up the server code locally in a separate process instead of remotely; col. 13, lines 5 – 25].

7. Although Held teaches the invention substantially as claimed, Held does not teach decoupling of one or more object references to the object from management of one or more virtual memory copies of object.

However, Thatte teaches decoupling of one or more object references to the object from management of one or more virtual memory copies of object [data structures of the proxy 186 (FIG. 14) for the server object reference 183 includes a proxy manager 250 to manage the facelets 232-233 for the server object 192; col. 19, lines 30 – 55 and col. 12, line 52 – col. 13, line 30].

8. It would have been obvious to a person of ordinary skill in the art at the time the invention was made to apply the teaching of decoupling of one or more object references to the object from management of one or more virtual memory copies of object as taught by Thatte to the invention of Held because this allows for automatic services that trigger on calls between contexts and provide extensible domain-specific behaviors in the execution environment [col. 4, lines 27 – 40 of Thatte].

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9. As to claim 3, Held as modified teaches the requester is one of another object located within the address space and an object request broker [col. 9, lines 15 – 32 of Thatte].

10. As to claim 4, Held as modified teaches the providing access comprises driving a method on the object [using a local RPC mechanism to the launched surrogate program 723 (or server executable) to invoke the RemCoActivateClass function; col. 14, lines 1 - 10 of Held].

11. As to claim 5, Held as modified teaches creating the local access proxy [class factory object is an object that can be used to create objects of the class corresponding to a particular CLSID; col. 7, lines 32 – 57 of Held].

12. As to claim 6, Held as modified teaches determining a type of the object being requested; and obtaining an instance of the local access proxy of the type [col. 20, lines 17 – 32 of Thatte].

13. As to claim 7, Held as modified teaches using a local proxy factory to provide the instance of the local access proxy [col. 27, line 65 – col. 28, line 20 of Thatte].

14. As to claim 8, Held as modified teaches providing a pointer of the instance of the local access proxy to the requester, wherein the requester uses the instance of the local access proxy to access the object [client program 601 receives the packet, it unmarshals the pointer and is then able to access the activated object; col. 11, lines 15 – 17 of Held].

15. As to claim 9, Held as modified teaches using, by the local access proxy, a reference to the object to provide access to the object [col. 11, lines 1 – 17 of Held].

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16. As to claim 10, Held as modified teaches use of the local access proxy enables the object to be independent of any object references owned by the requester [col. 12, line 52 – col. 13, line 5 of Thatte].

17. As to claim 32, Held as modified teaches the separation results in a life cycle for the object being independent of a life cycle for the one or more object references [contexts 140-146 of the component application objects 110-118 in the illustrated environment 100 are immutable during the component application objects' lifetimes; col. 12, lines 22 – 40 of Thatte].

18. As to claim 33, Held as modified teaches the providing comprises the local access proxy communicating with a management agent [wrapper object 230 acts as a proxy manager in the COM RPC Standard Marshaling Architecture to manage the facelets 232-233 and stublets 236-237; col. 17, lines 45 – 66 of Thatte].

19. As to claim 34, Held as modified teaches the communicating comprises communicating prior to the access [client program 601 communicates with the client service control manager 602 through local remote procedure call ("RPC") mechanisms; col. 10, lines 34 – 65 of Held].

20. As to claim 35, Held as modified teaches the communicating comprises communicating after the access [client service control manager 602 communicates directly using local RPC mechanisms with a server executable or with a surrogate process that has loaded the server DLL; col. 10, lines 60 - 67 of Held].

21. As to claim 36, Held as modified teaches the management agent comprises a container [apartment (e.g., apartments 120-123); col. 11, lines 23 – 46 of Thatte].

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22. As to claim 37, Held as modified teaches interposing at least one management policy on the access via the management agent [policies; col. 12, line 52 – col. 13, line 5 of Thatte].

23. As to claims 11, 13 – 20 and 38 – 43, these are system claims that correspond to method claims 1, 3 – 10 and 32 – 37; note the rejection to claims 1, 3 – 10 and 32 – 37 above, which also meet these system claims.

24. As to claims 21 and 50, these are similar in scope to claims 11 and 39 above; therefore, they are rejected for the same reasons as claims 11 and 39 above.

25. As to claims 22, 24 – 31 and 44 – 49, these are product claims that correspond to method claims 1, 3 – 10 and 32 – 37; note the rejection to claims 1, 3 – 10 and 32 – 37 above, which also meet these product claims.

### ***Response to Arguments***

26. Applicant's arguments filed 02/06/2006 have been fully considered but they are not persuasive. In response to the Non-Final rejection dated 11/02/2005, applicant argues:

(1)

Against the requesting aspect of claim 1, for example, the Office Action cites to Held et al. at column 10, lines 62-67. According to that aspect, the requestor and the object are both located in the same address space. However, a careful reading of the cited section of Thatte et al. and the surrounding text reveals no teaching about the location of the object relative to the requestor. The cited section merely teaches that if server code corresponding to the activation request needs to execute locally (i.e., on the server node where the code is located), then the client service control manager communicates directly (presumably with the server node). The beginning of that paragraph of Held et al. at column 10, line 35 clearly indicates the context of the cited section is *remote accessing of an object*; that is, an object remote from the requestor. Applicants submit this is quite the opposite of the object being in the same address space as the requestor.

(2)

As another example, against the claim 1 aspect of use of the local access proxy providing separation of the management of object reference(s) from management of virtual memory cop(ies) of the object, the Office Action at numbered section 6 cites to Thatte et al. However, the facelets (and associated facelet-managing proxy manager) are only used when the client component application object and the server component application object are in *different* apartments (column 13, lines 42-63), which are in *separate domains* (column 11, lines 27-28). In contrast, claim 1 recites that the local access proxy is in the *same address space* as both the requestor and the object to which access is being requested.

In response to argument (1), examiner respectfully disagrees and submits that Held supports both local and remote procedure calls [i.e. col. 10, line 34 – col. 11, line 17, this portion of Held was cited in the rejection of claim 1 above]. Although Held discloses remote accessing of an object in the first sentence of the cited portion, Held also discloses local RPC request, which refers to the calling of a procedure on the same node [i.e. col. 10, lines 49-51 and col. 12, lines 30-56]. When the requestor and the object are located on the same node, they are executing on the same computer and are resident on the same address space. Therefore, Held clearly teaches the requestor and the object are resident on the same address space.

As to argument (2), examiner respectfully disagrees because Thatte clearly discloses that the client object and the server object can reside in the same apartment [a client component application object 190 is in the same apartment as a server component application object 192; col. 13, lines 41-64, emphasis added]. Again, Thatte also discloses that the client object and the server object can reside in the same or different apartment, which is similar to the teachings of Held. Therefore, both Held and Thatte teach local procedure calls [i.e. when the request and the objects are executing on the same node or the same apartment as taught by Held and Thatte respectively]. The combination of Held and Thatte teach the applicant's invention as claimed.

### **Conclusion**

27. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).



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A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

### CONTACT INFORMATION


28. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Li B. Zhen whose telephone number is (571) 272-3768. The examiner can normally be reached on Mon - Fri, 8:30am - 5pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, William Thomson can be reached on 571-272-3718. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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Art Unit 2194

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